

Habitat Assessment Worksheet – Part III of III

Part III - Habitat Quality Index

Habitat Parameter	Scoring Category			
Available Instream Cover	Abundant >50% of substrate favorable for colonization and fish cover; good mix of several stable (not new fall or transient) cover types such as snags, cobble, undercut banks, macrophytes	Common 30-50% of substrate supports stable habitat; adequate habitat for maintenance of populations; may be limited in the number of different habitat types	Rare 10-29.9% of substrate supports stable habitat; habitat availability less than desirable; substrate frequently disturbed or removed	Absent <10% of substrate supports stable habitat; lack of habitat is obvious; substrate unstable or lacking
Score_____	4	3	2	1
Bottom Substrate Stability	Stable >50% gravel or larger substrate; gravel, cobble, boulders; dominant substrate type is gravel or larger	Moderately Stable 30-50% gravel or larger substrate; dominant substrate type is mix of gravel with some finer sediments	Moderately Unstable 10-29.9% gravel or larger substrate; dominant substrate type is finer than gravel, but may still be a mix of sizes	Unstable <10% gravel or larger substrate; substrate is uniform sand, silt, clay or bedrock
Score_____	4	3	2	1
Number of Riffles To be counted, riffles must extend >50% the width of the channel and be at least as long as the channel width	Abundant ≥ 5 riffles	Common 2-4 riffles	Rare 1 riffle	Absent No riffles
Score_____	4	3	2	1
Dimensions of Largest Pool	Large Pool covers more than 50% of the channel width; maximum depth is >1 meter	Moderate Pool covers approximately 50% or slightly less of the channel width; maximum depth is 0.5-1 meter	Small Pool covers approximately 25% of the channel width; maximum depth is <0.5 meter	Absent No existing pools; only shallow auxiliary pockets
Score_____	4	3	2	1
Channel Flow Status	High Water reaches the base of both lower banks; < 5% of channel substrate is exposed	Moderate Water fills >75% of the channel; or <25% of channel substrate is exposed	Low Water fills 25-75% of the available channel and/or riffle substrates are mostly exposed	No Flow Very little water in the channel and mostly present in standing pools; or stream is dry
Score_____	3	2	1	0

Part III - Habitat Quality Index (continued)

Habitat Parameter	Scoring Category			
Bank Stability	Stable Little evidence (<10%) of erosion or bank failure; bank angles average <30°	Moderately Stable Some evidence (10-29.9%) of erosion or bank failure; small areas of erosion mostly healed over; bank angles average 30-39.9°	Moderately Unstable Evidence of erosion or bank failure is common (30-50%); high potential of erosion during flooding; bank angles average 40-60°	Unstable Large and frequent evidence (>50%) of erosion or bank failure; raw areas frequent along steep banks; bank angles average >60°
Score_____	3	2	1	0
Channel Sinuosity	High ≥ 2 well-defined bends with deep outside areas (cut banks) and shallow inside areas (point bars) present	Moderate 1 well-defined bend <u>or</u> ≥ 3 moderately-defined bends present	Low <3 moderately-defined bends <u>or</u> only poorly-defined bends present	None Straight channel; may be channelized
Score_____	3	2	1	0
Riparian Buffer Vegetation	Extensive Width of natural buffer is >20 meters	Wide Width of natural buffer is 10.1-20 meters	Moderate Width of natural buffer is 5-10 meters	Narrow Width of natural buffer is <5 meters
Score_____	3	2	1	0
Aesthetics of Reach	Wilderness Outstanding natural beauty; usually wooded or unpastured area; water clarity is usually exceptional	Natural Area Trees and/or native vegetation are common; some development evident (from fields, pastures, dwellings); water clarity may be slightly turbid	Common Setting Not offensive; area is developed, but uncluttered such as in an urban park; water clarity may be turbid or discolored	Offensive Stream does not enhance the aesthetics of the area; cluttered; highly developed; may be a dumping area; water clarity is usually turbid or discolored
Score_____	3	2	1	0
Total Score _____				
HABITAT QUALITY INDEX 26 - 31 Exceptional 20 - 25 High 14 - 19 Intermediate ≤ 13 Limited				